

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANTS : Moens et al.

SERIAL NUMBER : 10/544,116 **EXAMINER :** Gregory Listvoyb

FILING DATE : October 4, 2005 **ART UNIT :** 1796

FOR : THERMOSETTING POWDER COMPOSITIONS FOR COATINGS

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Commissioner for Patents
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PRE-APPEAL BRIEF REQUEST FOR PANEL REVIEW

Pursuant to the OG Notice dated July 12, 2005, Applicants hereby request panel review of the final rejection of claims 29-42 in the Examiner's last paper mailed January 4, 2010 for the above-referenced application. No amendments are being filed with this Request. A Notice of Appeal and corresponding fee are filed concurrently herewith.

The panel review is requested for the reasons stated below, which are provided in support of this Request and are within the 5 page limit:

- **Remarks/Arguments** begin on page 2.

Remarks/Arguments:

Claims 29-42 are pending in the case and are listed in Applicants' paper filed September 17, 2009, at pages 2-5. Claims 29 and 42 are independent. In short, independent claim 1 recites powdered thermosetting compositions comprising:

a) a carboxyl functional amorphous polyester with an acid number ranging from 12 to 34 mg KOH/g, wherein the polyester is prepared from:

- i) a polyacid constituent comprising from 81 to 100% mol of isophthalic acid, and
- ii) a polyol constituent comprising from 15 to 65% mol of one or more linear chain aliphatic C₄-C₁₆ diol, and from 35 to 85% mol of neopentyl glycol,

and

b) a cross-linking agent comprising at least two β -hydroxyalkylamide groups with the proviso that said powdered thermosetting composition does not contain a semi-crystalline polyester.

Independent claim 42 differs from claim 1 only in that it recites elements (a) and (b) as a weight percentage of the total weight of the composition. Accordingly, the arguments presented herein are applicable to both independent claims.

Applicants also reiterate the summary of the invention from their paper filed September 17, 2009 at pages 6-7, but do not repeat it here.

Rejections under 35 USC § 102

Applicants respectfully submit that there is clear error in maintaining an anticipation rejection based on a reference that does not disclose with sufficient specificity the range of polyols recited by the claimed invention. It is a well established principle of patent law that the disclosure of a genus in the prior art is not necessarily a disclosure of every species that is a

member of that genus. Applicants rely on MPEP 2131.03 (II) and *Atofina v. Great Lakes Chemical Corp.* 441 F.3d 991, 78 USPQ2d 1417 (Fed. Cir. 2006) in support of their position.

Of the 50 point range of neopentyl glycol (NPG) and aliphatic polyol claimed by the instant invention only 15 points even overlap with the range disclosed by the cited reference, Moens. More importantly, the slightly overlapping range is not disclosed as a species by Moens, nor has Moens specifically disclosed any of the intermediate points in the claimed range. Applicants have treated this issue more fully in their paper filed September 17, 2009 at pages 7-8. *See also* Applicants' Interview Summary filed August 24, 2009 at page 2.

The Examiner's statement in the last sentence on page 8 of the present final Office Action comparing the Tg values disclosed by the cited reference and those claimed is of no consequence. While a claim is anticipated if each and every element is found either expressly or inherently in a single reference, that reference must still describe the claimed subject matter with sufficient clarity and detail to establish that the claimed subject matter existed and that its existence would be recognized by persons of ordinary skill in the art. Furthermore, the Examiner has not provided a basis in fact or in technical reasoning to reasonably support the determination that the claimed range necessarily flows from the teachings of the cited prior art reference.

Accordingly, because the cited reference does not disclose each and every element of the claimed invention with sufficient specificity, a rejection under 35 USC § 102 cannot be maintained. Withdrawal of the rejection is respectfully requested.

Rejections under 35 USC § 103

A rejection based on obviousness cannot be sustained where each reference of the combination has not been considered as a whole and no recognition has been given to where the references diverge and teach away from the claimed invention. It is clear error to pick and

choose among individual parts of assorted prior art references as a mosaic to recreate a facsimile of the claimed invention. Applicants rely on MPEP § 2141.02, part VI in support of their position. *See also* Applicants' paper filed September 17, 2009 at page 9.

Acknowledging that Kaplan does not disclose the exact composition of amorphous polyester as claimed in claim 20 (now claim 29) (*see* final Office Action mailed January 4, 2010 at page 5), the Examiner relies on Moens for such teaching. However, reliance on Moens to complete the teachings of Kaplan ignores the fact that, viewed as a whole, Moens requires a polyester composition having both an amorphous polyester and a semi-crystalline polyester (which is specifically excluded by the claimed invention). Reliance on Moens further ignores the fact that the reference specifically discourages the use of isophthalic acid-rich amorphous polyester compositions for use in powder coatings (such as that of the claimed invention) due to their "medicare [sic, mediocre] mechanical properties," such as flexibility *See Moens*, col. 19, lines 10-16. *See also* Applicants' paper filed September 17, 2009 at page 10.

While the Examiner indicates that both references independently teach a combination of semi-crystalline and amorphous polyesters used for coatings (*see* final Office Action of Jan. 4, 2010 at page 9), no basis is provided as to why one of ordinary skill in the art would have even been motivated to use the amorphous polyester compositions of Moens over those taught by Kaplan. Nor does the Examiner's reference to anticipation of a species claim and citation of MPEP 2131.02 in support of the conclusion of obviousness (*see id.*) provide any clarification of the issue.

Finally, the Examiner's assertion that tere- and iso-phthalic acid can be used interchangeably (*see id.*) is a factual error. While powder coatings can contain amorphous polyester compositions having both tere- and iso-phthalic acid, prior to the present invention those powder coatings rich in isophthalic acid provided excellent outdoor durability, but poor

flexibility. Conversely, those powder coatings rich in terephthalic acid provided better flexibility, but poor visual performance. Up until the time of Applicants' invention it was believed that powder coatings having good flexibility were only achievable by use of terephthalic-rich polyester, or an isophthalic-rich polyester with the addition of a semi-crystalline polyester and a high amount (85% mol or greater) of a cyclic C4-C16 diol (e.g., 1,4-cyclohexanediol). *See Moens*, col. 3, lines 55-61; col. 4, lines 55-61; and col. 19, lines 10-13; *see also* Comparative Examples 31-32. Applicants' invention disproves this notion and their evidence of non-obviousness as demonstrated by:

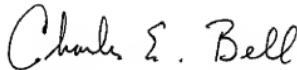
- Examples 7-14 (compositions according to the invention);
- Comparative Example 15 (showing that powders containing terephthalic acid-rich polyesters and neopentyl glycol (NPG) have good flexibility but score less well on the visual aspect (orange peel)), and
- Comparative Example 16 (showing that compositions composed purely of isophthalic acid polyesters and NPG have problems with orange peel and lack flexibility),

as presented in Table 2 of the instant specification, should not be ignored.

For at least the foregoing reasons, Applicants contend that the claimed invention provides a novel and non-obvious isophthalic-rich polyester having i) outstanding properties, ii) outstanding weatherability and iii) improved flexibility. *See also* Published Application No. 2006/0217520 at paragraph [0084]. Accordingly, Applicants assert that the claims as pending should be allowed and respectfully and earnestly request the panel for same.

Without an extension of time this paper is due on or before April 5, 2010, the nominal due date of April 4, 2010 occurring on a Sunday. The Commissioner is hereby authorized to charge payment of any fees that may be required, or credit any overpayment of same, to Deposit Account No. 03-4083.

Respectfully submitted,



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